GUEST EDITORIAL PREFACE

Special Issue on the 9th French-Speaking Workshop on Data Warehousing and OLAP and 1st Workshop on Social BI

Matteo Golfarelli, Department of Computer Science and Engineering, University of Bologna, Bologna, Italy

Patrick Marcel, Laboratory of Computer Science, University of Tours, Tours, France

Verónika Peralta, Laboratory of Computer Science, University of Tours, Tours, France

Stefano Rizzi, Department of Computer Science and Engineering, University of Bologna, Bologna, Italy

Data warehousing and OLAP, the corner stones of Business Intelligence, are now confronted to new challenges with the proliferation of new data types, new architectures and infrastructures, continuously increasing data volumes and the will to make them accessible to various kinds of users. The French-speaking workshop on Data warehousing and OLAP (EDA) is a yearly forum where researchers and practioners meet to share their advances in these fields. The ninth edition of EDA was organised in Blois on June 13-14th, 2013, and attracted 21 submissions among which the best six were presented as long articles during the workshop. The authors of these six articles were then given the opportunity to extend their work and submit it to this special issue. The submissions underwent a two-round reviewing process, resulting in four of them being finally selected for this special issue.

These four articles describe contributions ranging from physical design of data warehouses to secure warehousing in the cloud to new OLAP operations on complex data. In "Coupling Materialized View Selection to Multi Query Optimization: Hyper Graph Approach", Boukora et al. identify an analogy between multi-query optimization and electronic design automation, and exploit it for the selection of materialized views. Multi-query optimization is also the focus of "Query Interaction based Approach for Horizontal Data Partitioning",

where Bellatreche et al. propose to leverage the interaction between OLAP queries for determining a horizontal partitionning scheme.

In "Contextualized Text OLAP Based on Information Retrieval", Oukid et al. propose a model for text cubes, with a text analysis measure and a dedicated aggregation operator. Finally, in "A Novel Multi-Secret Sharing Approach for Secure Data Warehousing and On-Line Analysis Processing in the Cloud", Attasena et al. propose an encryption method enforcing integrity, privacy and availability when deplyoing a data warehouse in the cloud.

The planetary success of social networks and the widespread diffusion of portable devices has resulted in the accumulation of enormous amounts of social content, that includes geolocation, preferences, opinions, news, articles, etc. Social Business Intelligence (SBI) is the discipline of effectively and efficiently combining this social content with corporate data to let decision-makers analyze the trends and moods perceived from the environment. The First International Workshop on Social Business Intelligence (SoBI) was held in Genoa, Italy, Sept. 1, 2013, in conjunction with the 17th East-European Conference on Advances in Databases and Information Systems (ADBIS 2013), and it successfully put together researchers and practitioners coming from different areas related to SBI for sharing their findings and cross-fertilizing their researches.

This special issue collects substantially extended version of two carefully-selected papers presented at the workshop. In the first paper, "SLOD-BI: An Open Data Infrastructure for Enabling Social Business Intelligence", Berlanga Llavori et al. discuss the opportunities and advantages of defining new data infrastructures for SBI, with specific reference to integrating social and corporate data. Their proposal follows the principles of the Linked Open Data initiative and inclides a novel method for data provisioning, called ETLink. The second paper, "Discovering hidden concepts in predictive models for texts' polarization" by Camillo and Liberati, is focused on the use of sentiment analysis techniques to move from a traditional view of CRM to a social-CRM perspective. In particular, it proposes to couple a robust supervised classification rule with a probabilistic kernel discriminant to effectively recognize sentiments extracted from the customer opinions.

We would like to thank all the authors for their commitment in producing the articles of this special issue, as well as the reviewers for the time they spent evaluating the manuscripts. Finally, we would like to warmly thank David Taniar and the team at IGI Global for their support and help in the preparation of this special issue.

Matteo Golfarelli
Patrick Marcel
Verónika Peralta
Stefano Rizzi
Guest Editors
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Matteo Golfarelli received his Ph.D. for his work on autonomous agents in 1998. In 2000 he joined the University of Bologna as a researcher. Since 2005 he is Associate Professor and teaches Information Systems, Database Systems, and Data Mining. He has published over 80 papers in refereed journals and international conferences in the fields of data warehousing, pattern recognition, mobile robotics, multi-agent systems. He is co-author of the book "Data Warehouse Design: Modern Principles and Methodologies". He served in the PC of several international conferences and as a reviewer in journals. He has been co-chair of DOLAP 2012 and is permanent co-chair of the Business Information System Conference. His current research interests include all the aspects related to business intelligence and data warehousing, in particular multidimensional modeling, business intelligence on social data, and data mining.

Patrick Marcel received his Ph.D. in 1998 from the National Institute of Applied Science (INSA) of Lyon, France. Since 1999 he is Assistant Professor at the University of Tours, where he is the local coordinator of the Erasmus Mundus Master's Course in Information Technology for Business Intelligence (IT4BI). He is a member of the Computer Science Laboratory of Tours, and has published numerous papers in international refereed journals and conferences in the fields of OLAP, query languages and data mining. He serverd as reviewer of several international conferences and journals including DaWaK, VLDB and TKDE. His current research interests include OLAP query personalization and recommendation, exploratory search.

Verónika Peralta received her Ph.D. in 2006 from the University of Versailles (France) and the University of the Republic (Uruguay). Since 2008 she is Associate Professor at the University of Tours, where she is coordinator of the Master Program on Information Systems for Decision Support (M2 SIAD). She has extended experience in teaching information systems, databases, data warehousing and data quality at several universities in France, Uruguay and Argentina. She has published numerous papers in international refereed journals and conferences in in the fields of data warehousing design, quality of data, quality of service and query personalization. Her current research interests include information quality, OLAP query recommendation and exploratory analysis.

Stefano Rizzi received his Ph.D. in 1996 from the University of Bologna, Italy. Since 2005 he is Full Professor at the University of Bologna, where he is the head of the Data Warehousing Laboratory and teaches Business Intelligence and Software Engineering. He has published more than 110 papers in international refereed journals and conferences mainly in the fields of data warehousing, business intelligence, and pattern recognition, and a research book on data warehouse design. He joined several research projects on the above areas and has been involved in the PANDA thematic network of the European Union concerning pattern-base management systems. He is member of the steering committee of ER and DOLAP. His current research interests include data warehouse design and business intelligence, in particular OLAP personalization, OLAM, social business intelligence, and analysis services for genomic data.